

What is claimed is:

1. A device for responding to an elevated pressure condition in a patient comprising:
 - an implant;
 - a pressure differential member disposed within said implant;
 - said implant sized and shaped so as to place said pressure differential member in communication with both an arterial side and a venous side of a vascular system; and
 - said pressure differential member configured for directing pressure increases in said arterial side to said venous side of said vascular system.
2. A device according to claim 1, wherein said pressure differential member is a valve.
3. A device according to claim 2, wherein said valve includes a pressure threshold actuation mechanism so as to cause opening of said valve at a predetermined pressure.
4. A device according to claim 3, wherein said valve is sized and shaped for placement in a heart wall separating said venous side from said arterial side of said vascular system.
5. A device according to claim 2, wherein said valve is sized and shaped for placement between a descending aorta and a inferior vena cava of a patient.
6. A device according to claim 1, wherein said pressure differential member is a membrane.
7. A device according to claim 6, wherein said membrane is sized and shaped for placement in an atrial wall separating a left ventricle of said arterial side and a right ventricle of said venous side.
8. A device according to claim 1, wherein said implant is a valve holder and said pressure differential is a valve.

9. A device according to claim 1, wherein said implant is a lumen and said pressure differential is a valve.

10. A method of controlling body lumen pressure fluctuations in a vascular system of a patient comprising:

diagnosing a patient having an elevated pressure condition in a body lumen;

placing a pressure differential device between an arterial side of said vascular system and a venous side of said vascular system;

diverting undesirable pressure increases in said arterial side of said vascular system through said pressure differential device into said venous side of said vascular system.

11. A method according to claim 10, wherein said diverting includes diverting said pressure increases through a wall of the heart.

12. A method according to claim 10, wherein said diverting includes diverting said pressure increases through a lumen of said pressure differential device from a descending aorta to an inferior vena cava.

13. A method according to claim 10, wherein said pressure differential device includes a valve and diverting includes diverting fluid through said valve.

14. A method according to claim 10, wherein said pressure differential device includes a distensible membrane and diverting includes diverting pressure against said distensible membrane.

15. A method according to claim 10, further including absorbing said undesirable pressure increases using a compliance device located in an aorta of said vascular system.